

# Project Update

Hillsborough MPO Committees Presentation  
February 2020

# 1. PROJECT OVERVIEW

# Project Goals



A transit solution that supports the City's vision for *a livable, connected, and competitive Downtown*.

- » Modernize and extend the existing system.
- » Improve access across the core of the City.
- » Connect premier cultural and entertainment destinations, educational institutions, and revitalizing urban neighborhoods.
- » Deliver first/last mile connectivity.
- » Set the stage for future extensions.

# Project Team

Project leader, sponsors, and partner.



STUDY LEADER



STUDY SPONSOR



PARTNER/OPERATOR



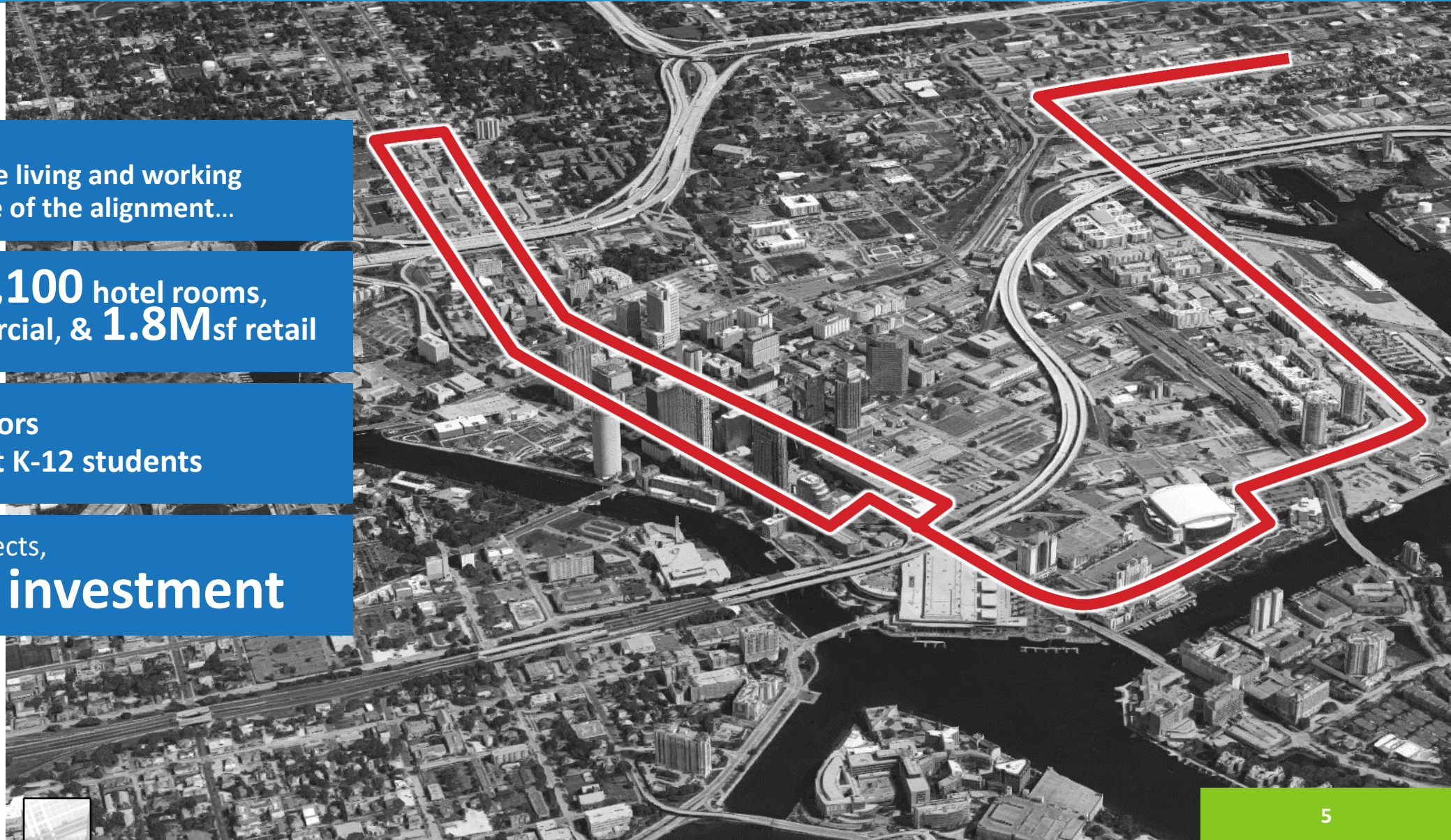
# Project Context

by 2040, **100k** people living and working  
in walking distance of the alignment...

**15k** residences, **2,100** hotel rooms,  
**3M**sf commercial, & **1.8M**sf retail

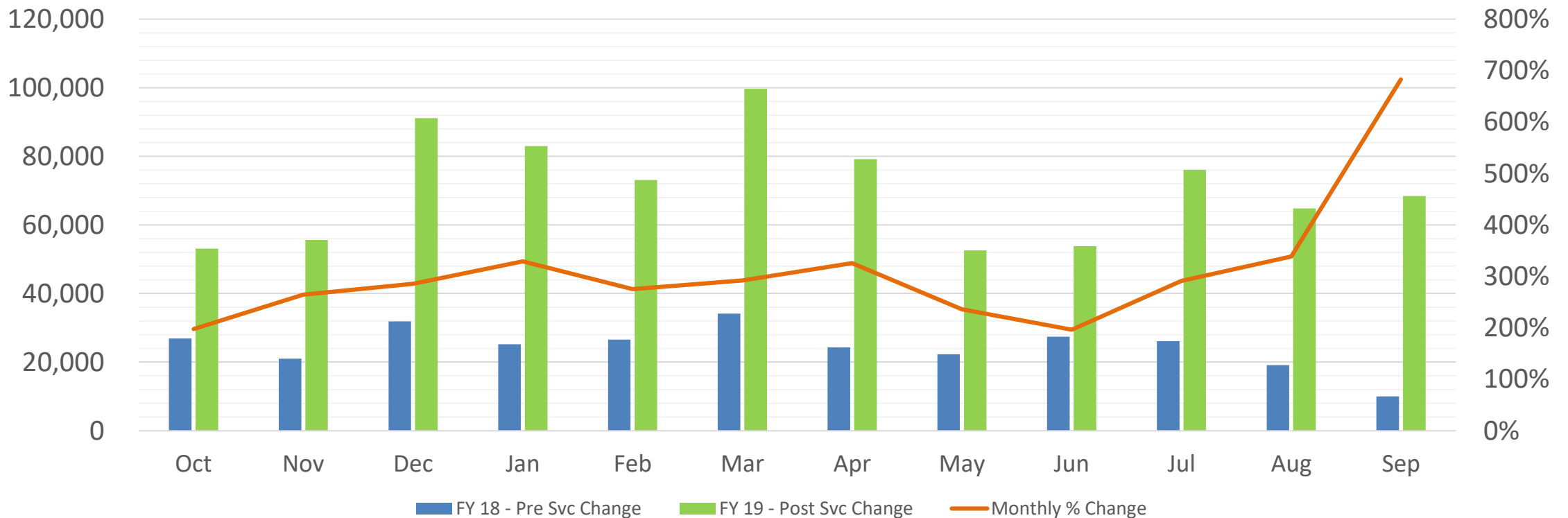
**100k** weekly visitors  
**26k** post K-12 students

in 5 multi-block projects,  
**>\$6B investment**



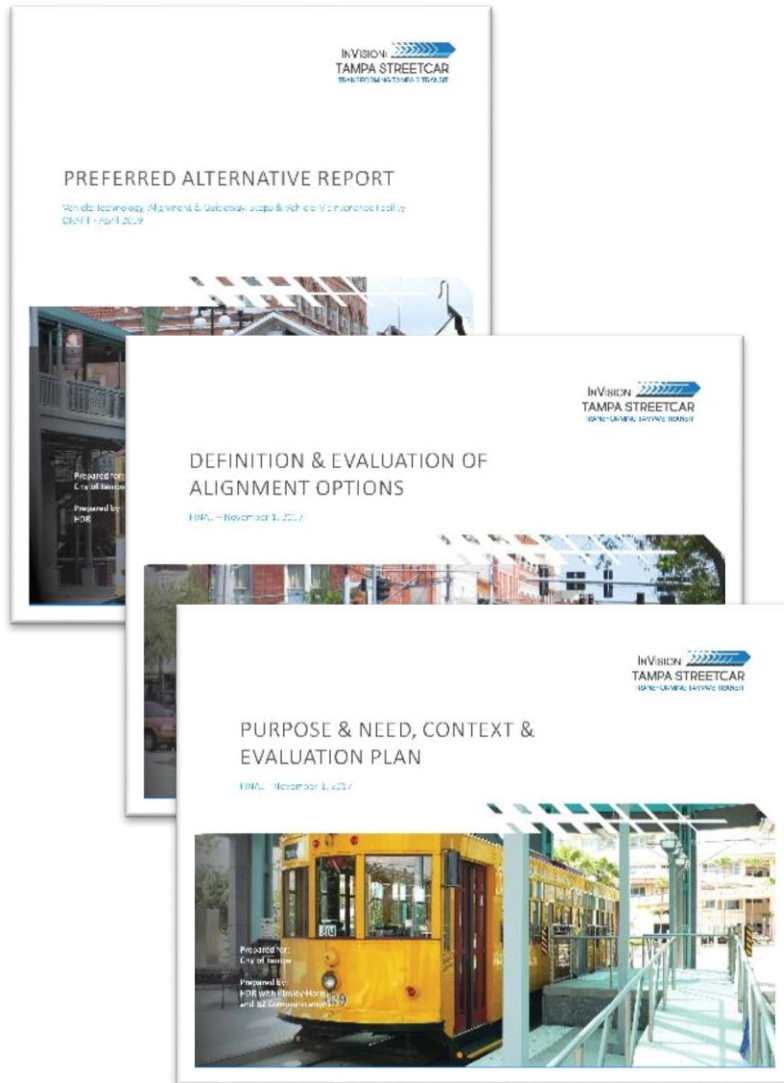
# Project Context

## RIDERSHIP BEFORE & AFTER SERVICE CHANGES



*FDOT's grant to improve service on the existing system has resulted in an unprecedented increase in ridership. Over the first year of improved frequency, extended service hours, and free fares, **ridership has gone up 288% over the previous year, from 295,000 in FY18 to 850,000 in FY19.***





- » Current Work – Project Development Underway with Completion Scheduled for Spring 2020
  - Accepted into FTA Small Starts Project Development – FTA Coordination Ongoing
  - Preferred Extension Alternative Selected
  - Environmental/Cultural/Traffic Assessments Submitted
  - Ridership Modeling Following HART's On-Board Survey
  - Existing Governance Agreements Under Review
  - Funding & Implementation Plan Underway
- » Spring 2020 – 30% Design Initiated
- » August 2020 – FTA Small Starts Ratings Submittals

# Public Engagement



## Five Public Workshops

- » 1: Project Purpose & Need
- » 2: Corridors for Extension
- » 3: Extension Alternatives
- » 4: Preferred Alignment
- » 5: Modernization & Extension Details

## Extensive Stakeholder Outreach

- » Presentations & Briefings
- » Small Group Meetings
- » Agency Coordination
- » Related Project Coordination

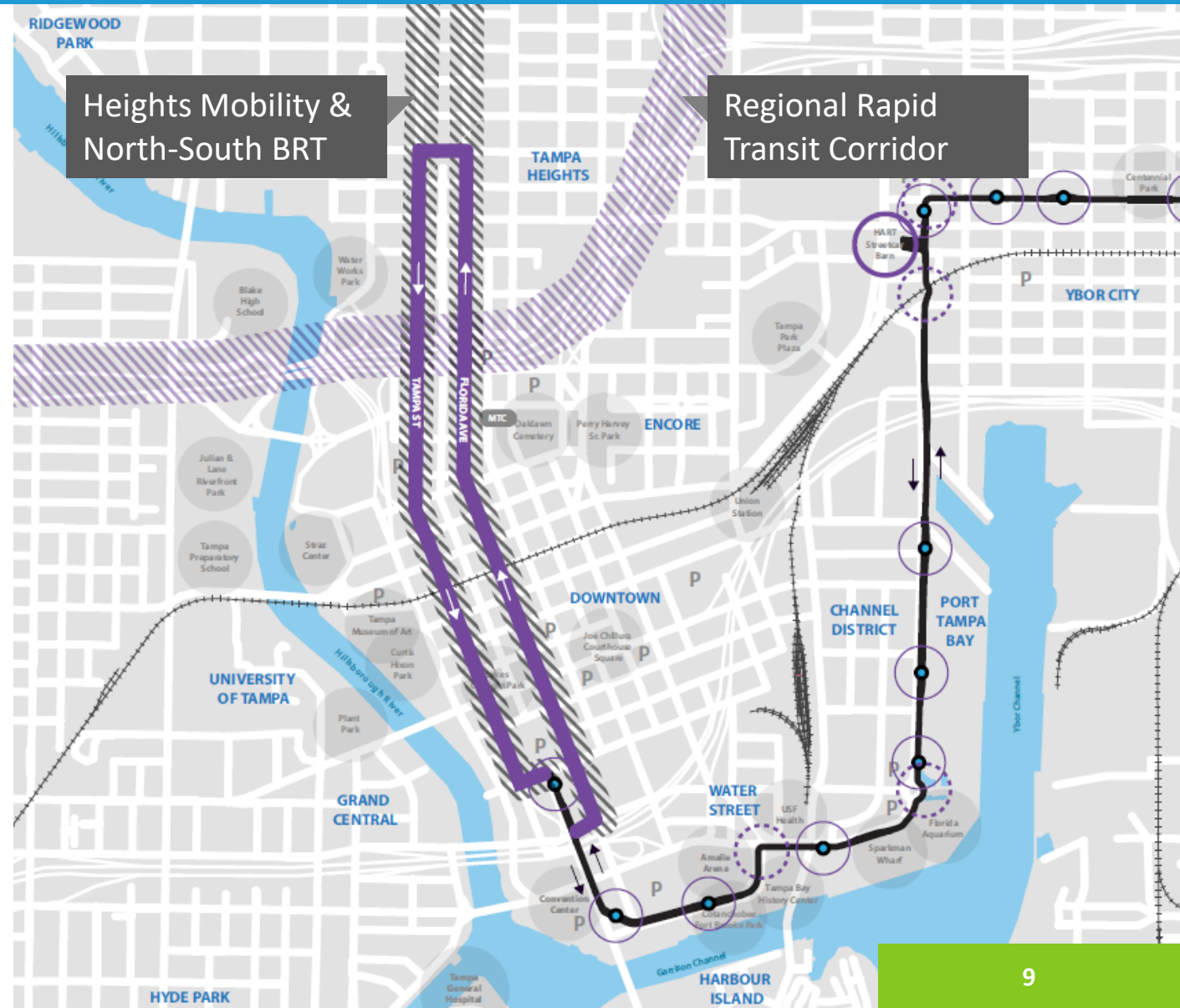




# Project Coordination

## Close Coordination with Related Projects

- » Heights Mobility Study (FDOT)
- » North-South BRT (HART)
- » Regional Rapid Transit (TBARTA)
- » Intermodal Center Study (FDOT)
- » Virgin/Brightline Tampa Extension



## 2. PROJECT DEFINITION

# Project Development



## **Deliver High Quality, Accessible Service**

- » One-seat trip from end to end
- » Full day, frequent service
- » High capacity vehicles
- » Stops with level boarding
- » Design for use by other transit vehicles

## **Maximize Travel Time Reliability**

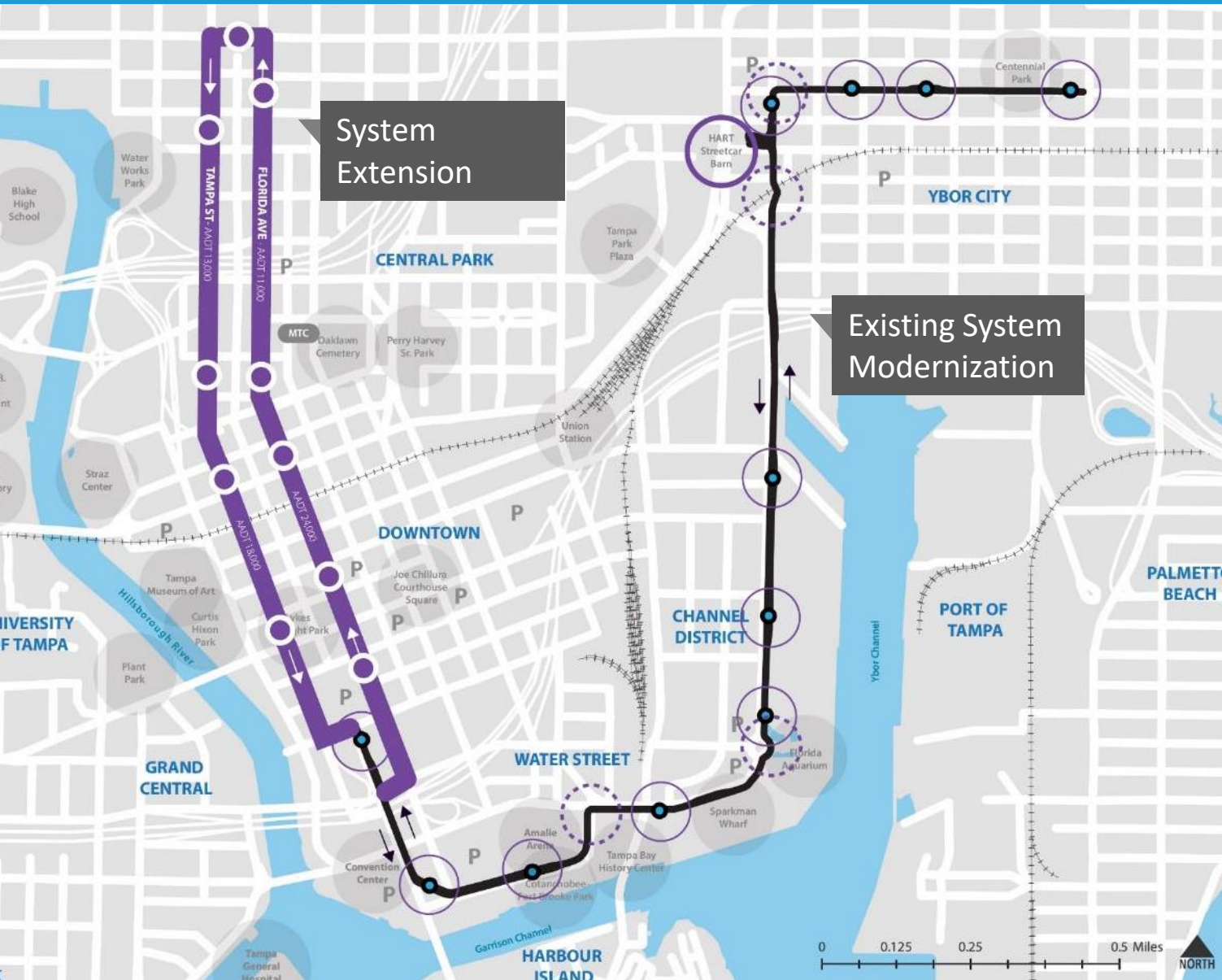
- » Avoid congestion (maximum exclusive guideway)
- » Avoid parking and turning queue conflicts

## **Minimize Impacts**

- » On roadway capacity
- » On parking, sidewalks, and property impacts
- » On cultural/archaeological resources



# Modernization & Extension



## MODERNIZATION (2.63 Miles)

- » Introduce modern vehicles
- » Reconstruct tight turns
- » Improve stops for level boarding
- » Expand streetcar barn
- » Upgrade traction power

## SYSTEM EXTENSION (1.2 Miles)

- » North on Florida Avenue
- » Turn on Palm Avenue
- » South on Tampa Street
- » East on Whiting

# Extension Alignment & Guideway

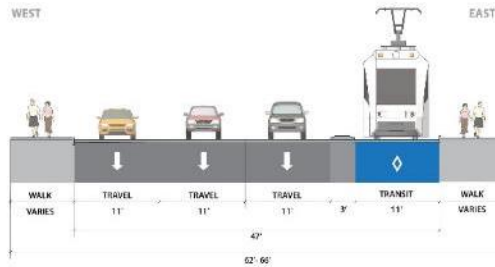


## Extension Overview

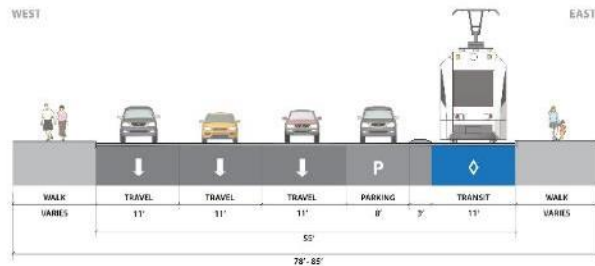
- » 1.3 Mile extension from existing terminus to Palm Avenue in Tampa Heights
- » Runs along Florida and Tampa Avenues as a couplet
- » Mostly exclusive guideway except northern portions of Florida Avenue and southern two blocks of Tampa Avenue
- » Right side stops on islands and sidewalks

# “Best Lane” Determination

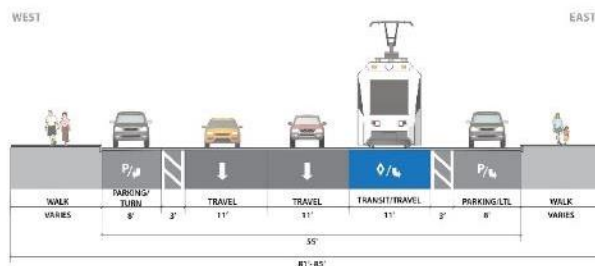
## 3 Tampa Street from Palm Avenue to Tyler Street East Side Running in Exclusive Transit Lane



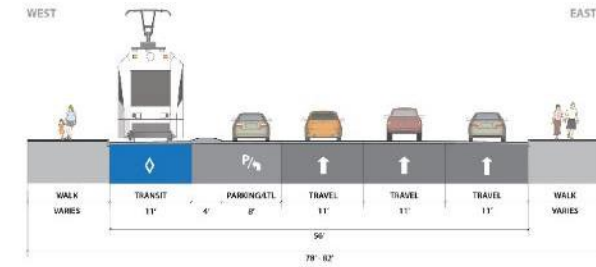
## 4 Tampa Street from Tyler Street to Kennedy Boulevard East Side Running in Exclusive Transit Lane



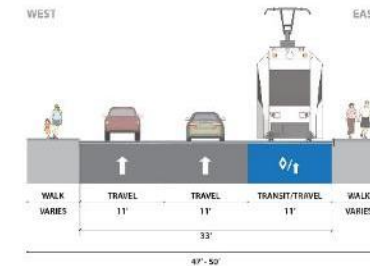
## 5 Tampa Street from Kennedy Boulevard to Whiting Street East Side Running in Shared Lane



## 1 Florida Avenue from Brorein Street to Harrison Street West Side Running in Exclusive Transit Lane



## 2 Florida Avenue from Harrison Street to Palm Avenue East Side Running in Shared Lane

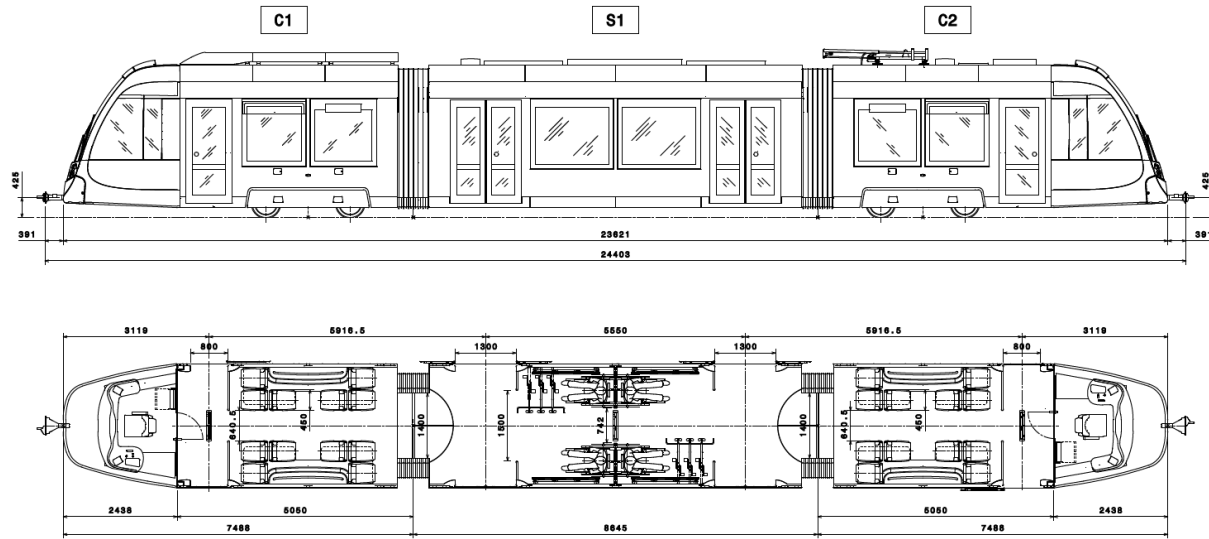


### RECOMMENDED GUIDEWAY NOTES

- » All typical sections are within existing right-of-way.
- » Franklin Street alignment is not recommended.



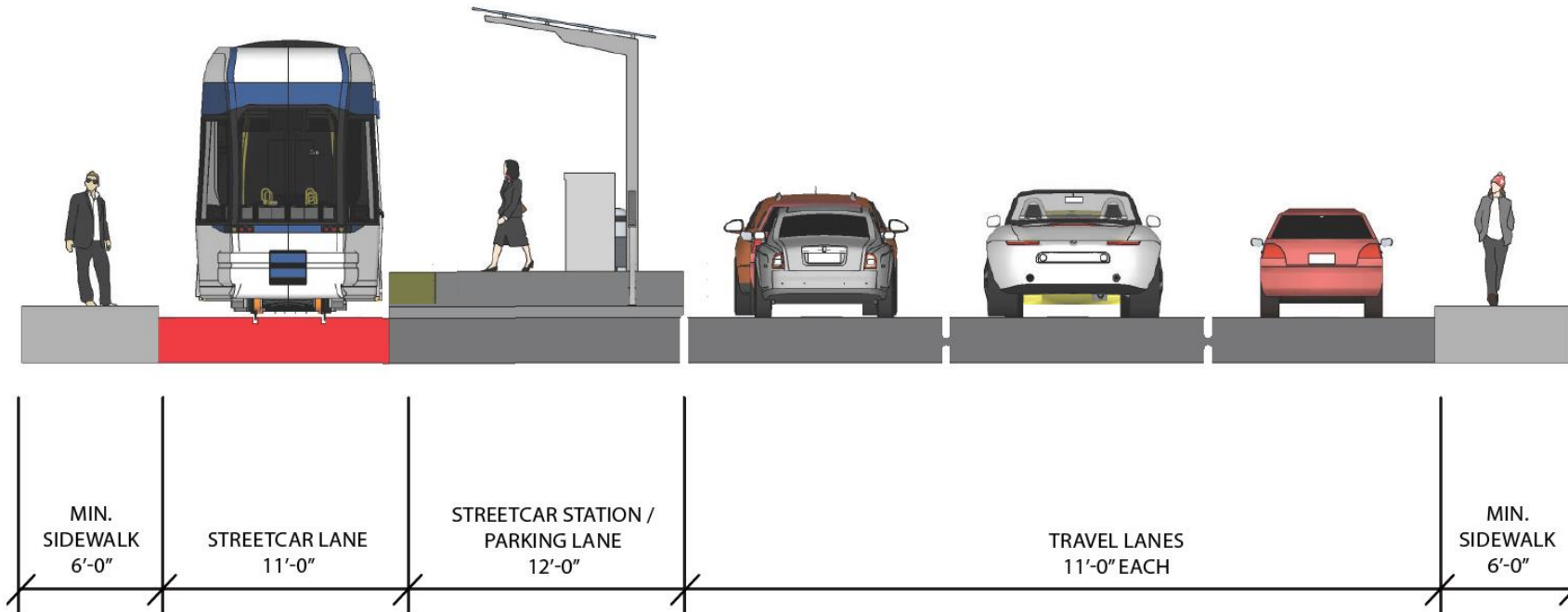
# Vehicle Technology



CAF Urbos 3 Streetcar (Cincinnati)

Criteria	Carbuilder		
Manufacturer	Brookville	CAF	Siemens
Model	Liberty	Urbos 3	S70 Short
Length	69 ft.*	74 ft.	82 ft.
Width	8.1 ft./8.7 ft.	8.1 ft./8.7 ft.	8.7 ft.
Low Floor	50%	100%	70%
Min Turning Radius	59 ft.	66 ft.	66 ft.
Seats/AW2 Load	43(+4)/90	32(+6)/116	52(+8)/90
Total Capacity	137	154	146
ADA Access	Level/Bridgeplate	Level	Level/Bridgeplate
Off Wire	Yes	Yes	Yes
Distance between Doors w/ Level Boarding	18 ft.	60 ft.	48 ft.
Doors/Side	2 (2 DBL)	4 (2 DBL, 2 Single)	4 (4 DBL)

# Stop Concepts



Examples from Kansas City, Missouri

## Typical Stop Configuration for Extension

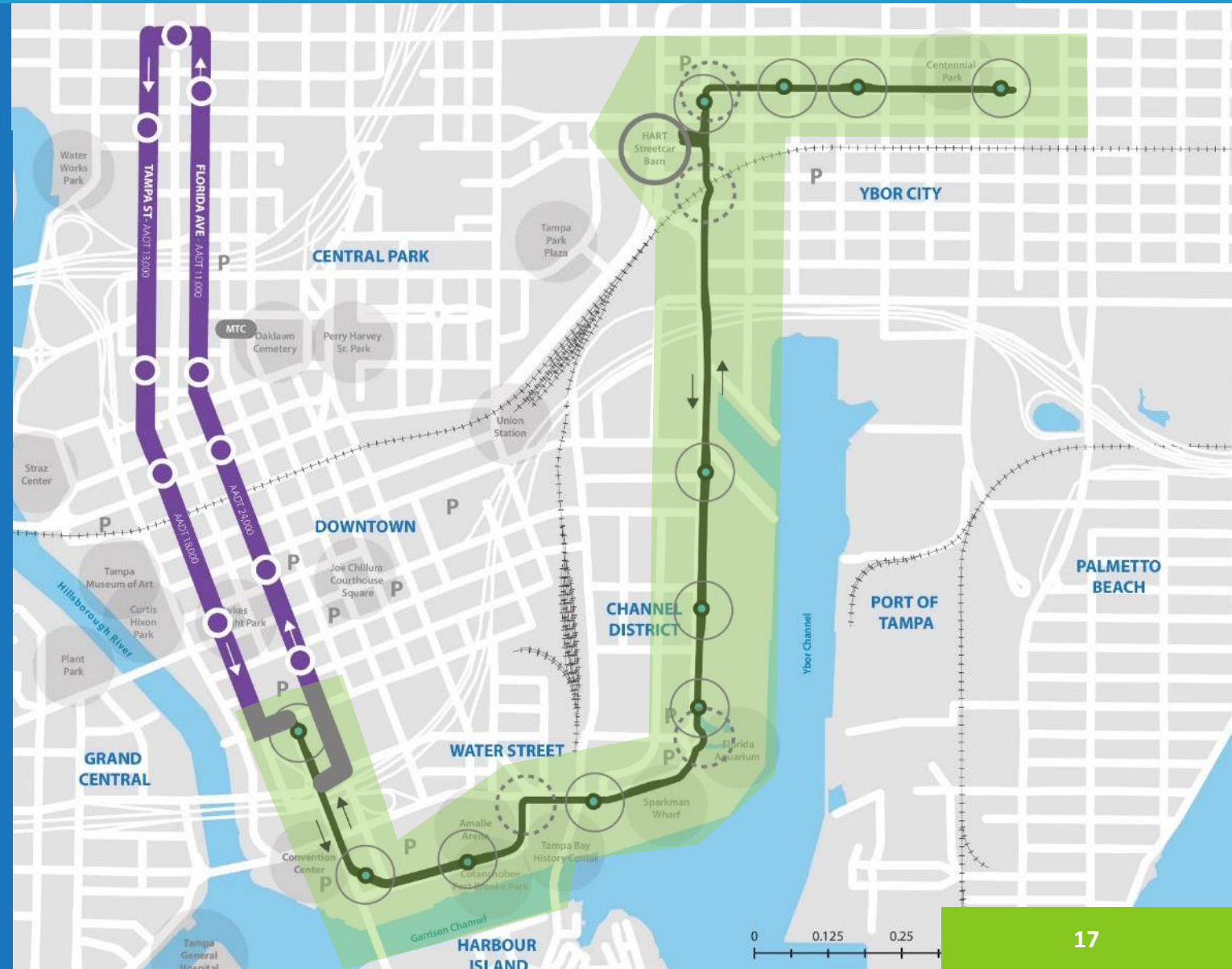
- » Transit guideway along left or right curb line
- » Most stops located on islands / 3 sidewalk stops require right-of-way
- » All platforms on right side of vehicle to allow stops to be shared with buses

# Existing System Modernization

## UPGRADES ALONG 2.7-MILE EXISTING SYSTEM

-  **GUIDEWAY RECONSTRUCTION**
  - » Reconstruct track sections to increase radius at tight corners
-  **STATION IMPROVEMENTS (11)**
  - » Removal of high block and ramp
  - » Platform reconstruction
-  **STREETCAR BARN EXPANSION**
  - » Expansion to fit modern streetcar vehicles and equipment

## UPGRADE TRACTION POWER





## 3. PROJECT COSTS & FUNDING

# 5. FUNDING

## COST ESTIMATE SUMMARY

MODERNIZATION	EXTENSION
Capital Costs	
<div>\$104,684</div> <div>(Year of Expenditure Dollars in 1,000s)</div>	<div>\$132,331</div> <div>(Year of Expenditure Dollars in 1,000s)</div>
Reconstruction of tight turns, upgrade of traction power system, and reconstruction of stops.	New 2.6 miles of track (1.3 route miles), traction power system extension and new substations, new stops, and CSX crossing.
Pro-rated share for purchase of modern streetcar vehicles.	
Pro-rated share of vehicle maintenance facility and yard renovation costs.	
Professional services and contingencies	
System Operations & Maintenance	
<div>\$8,000</div> <div>(Year of Expenditure Dollars in 1,000s)</div>	
Open year annual costs for premium service on full system.	

# Project Cost Estimates

## CAPITAL COST ESTIMATE BREAKDOWN (In FTA SCC Format)

Standard Capital Cost Categories	Year of Expenditure (YOE) Dollars in 1,000s					
	Extension	VMF & Yard	Modernization	Vehicles	Total Costs	%
10 Guideway & Track Elements	\$14,776	\$0	\$1,343	\$0	\$16,119	6.8%
20 Stations, Stops, Terminals, Intermodal	\$3,758	\$0	\$4,325	\$0	\$8,083	3.4%
30 Support Facilities (Yard, Shop, Admin)	\$0	\$14,783	\$0	\$0	\$14,783	6.2%
40 Sitework & Special Conditions	\$25,580	\$2,217	\$3,726	\$0	\$31,523	13.3%
50 Systems	\$19,409	\$0	\$9,706	\$0	\$29,115	12.3%
60 Row, Land, Existing Improvements	\$1,109	\$0	\$0	\$0	\$1,109	0.5%
70 Vehicles	\$0	\$0	\$0	\$73,785	\$73,785	31.1%
80 Professional Services	\$20,706	\$4,882	\$6,289	\$3,869	\$35,746	15.1%
90 Unallocated Contingency	\$10,305	\$2,687	\$3,095	\$10,666	\$26,753	11.3%
100 Finance Charges	\$0	\$0	\$0	\$0	\$0	0.0%
<b>TOTAL CAPITAL COST</b>	<b>\$95,643</b>	<b>\$24,569</b>	<b>\$28,484</b>	<b>\$88,320</b>	<b>\$237,016</b>	<b>100.0%</b>



# Project Cost Estimates

## PRELIMINARY FUNDING PLAN - MODERNIZATION & EXTENSION

Funding Source	Year of Expenditure (YOE) Dollars in 1,000s					
	Extension		Modernization		Total Project	
	\$	%	\$	%	\$	%
Federal CIG Small Starts	\$66,166	50%	\$0	0%	\$66,166	28%
FDOT New Starts	\$33,083	25%	\$52,342	50%	\$85,425	36%
Local/Other	\$33,083	25%	\$52,342	50%	\$85,425	36%
<b>TOTAL</b>	<b>\$132,332</b>	<b>100%</b>	<b>\$104,684</b>	<b>100%</b>	<b>\$237,016</b>	<b>100%</b>

Assumes allocation of prorated share of costs for modern vehicles and vehicle maintenance and storage facility to be split between modernization and extension.

## PRELIMINARY FUNDING PLAN – FUNDING SOURCES

Funding Source	Year of Expenditure (YOE) Dollars in 1,000s	
	\$	%
<b>Federal CIG Small Starts</b>	<b>\$66,166</b>	<b>28%</b>
<b>FDOT New Starts</b>	<b>\$85,425</b>	<b>36%</b>
<b>Local/Other</b>	<b>\$85,425</b>	<b>36%</b>
City Surtax	tbd	tbd
City Other	tbd	tbd
HART Surtax	tbd	tbd
HART Other	tbd	tbd
Other Local	tbd	tbd
<b>TOTAL</b>	<b>\$237,016</b>	<b>100%</b>

- » Working with FTA on project definition to clarify project costs eligible for funding under FTA Small Starts.
- » Preparing draft project Financial Plan to determine amounts and sources of funds for capital and operating costs.
- » Financial Plan to be complete Spring 2020 for review with FTA in advance of August 2020 submittal of ratings reports.

## 4. PROJECT SCHEDULE

# Next Steps

